

IN THE CLAIMS:

Please amend claims 4-7, 13-15 and 17-23 as follows:

4. (Amended) Dispensing system of micro-droplets according to claim 1, wherein the membrane or the substrate has a multi-layered structure that integrates the micro-ducts tri-dimensionally in different layers, the micro-ducts then being coupled to the wells by connections perpendicular to the upper openings of the wells.

5. (Amended) Dispensing system of micro-droplets according to claim 1, wherein the whole of the means for deforming is managed by a control unit programmable through a multiplexing network to trigger simultaneously or successively the suction or the ejection of identical or different reagents through the wells, by blocks of pre-selected wells or by certain pre-selected wells.

6. (Amended) Dispensing system of micro-droplets according to claim 1, wherein the material of the substrate or of the membrane is chosen among semiconducting materials, polysilicon, glass, silicon nitrides, ceramics, thermoplastic materials, elastomers, thick photosensitive resins, and electro-formed or electro-eroded metals.

7. (Amended) Dispensing system of micro-droplets according to claim 5, wherein the etching of the substrate or of the membrane is chosen among chemical etching, RIE, D-RIE, photolithography, etching by electroerosion or electroforming (6), moulding

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and polymerisation, laser cutting, ultrasounds, or the projection of abrasives.

13. (Amended) Dispensing cartridge comprising at least a dispensing system according to claim 1, pre-filled with reactants (51), and with titration plates (81) that can show micro-bowls (80) formed by micro-electronic type etching, by manufacturing, by moulding, and by thermoforming.

14. (Amended) Dispensing kit comprising at least a dispensing system according to claim 1, equipped with at least one aspiration pump (8), and at least one titration plate (81), which can be pre-filled with reagents.

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15. (Amended) Cartridge according to claim 13, wherein the titration plate shows micro-bowls equipped with polarised electrodes, the cell reactivity test being optical or electrical.

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17. (Amended) Application of the cartridge according to claim 13 to the preparation of bio-chips, by synthesis in situ or deposit of pre-synthesised oligonucleotides, to the screening of biological, chemical molecules, or on cells, to the preparation of drugs or to pharmaceutical tests or of immunological, biochemical or genetic screening.

18. (Amended) Application of the dispensing system according to claim 1, to the percutaneous administration of drugs by iontophoresis consisting of an application

system of a difference of potential suitable on a piezoelectric cell (70) for the administration of a calibrated quantity of at least one drug contained or formed in at least one well.

19. (Amended) Application to the screening of test cells in pharmacology of a dispensing system according to claim 1, wherein drugs are deposited on the cells contained in the micro-bowls (80) of a titration plate (81), equipped with polarised electrodes, the cell reactivity test being optical or electrical.

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20. (Amended) Application according to claim 19 where a potential difference of adapted value is applied between said electrodes in order to generate a polarisation in the cells and thus favour the therapeutic effect on the cells.

21. (Amended) Application of the dispensing system according to claim 1, to the selective filtration by fixation on the walls of the wells of a dispensing head for identical or different bio-cells or for the biochemical compounds by well or by block of wells.

22. (Amended) Application of the dispensing system according to claim 21, where the dispensing head is integrated to the tip of the syringe.

23. (Amended) Application of the dispensing system according to claim 1, to the

parallel or sequential feeding of the columns of mass spectrometer or of chromatographs.

Add the following claims 24-28 as follows:

24. Dispensing system of micro-droplets according to claim 6, wherein the etching of the substrate or of the membrane is chosen among chemical etching, RIE, D-RIE, photolithography, etching by electroerosion or electroforming (6), moulding and polymerisation, laser cutting, ultrasounds, or the projection of abrasives.

25. Dispensing system of micro-droplets according to claim 24, wherein the membrane is etched to create a network of micro-ducts to feed the wells, said micro-ducts being coupled at the tip to at least one reagent feeding reservoir.

26. Kit according to claim 14, wherein the titration plate shows micro-bowls equipped with polarised electrodes, the cell reactivity test being optical or electrical.

27. Titration plate according to claim 26, wherein a potential difference is applied between said electrodes in order to generate a polarisation in the cell and favour the therapeutical effect on the cells.